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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/665,282	09/19/2003	James M. Mathewson II	RSW920030126US1	5618
7590	01/25/2005		EXAMINER	
A. Bruce Clay IBM Corporation T81/503 PO Box 12195 Research Triangle Park, NC 27709			LAI, ANNE VIET NGA	
		ART UNIT	PAPER NUMBER	
		2636		

DATE MAILED: 01/25/2005

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary	Application No.	Applicant(s)	
	10/665,282	MATHEWSON ET AL.	
	Examiner	Art Unit	
	Anne V. Lai	2636	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --
Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

1) Responsive to communication(s) filed on 19 September 2003.
 2a) This action is **FINAL**. 2b) This action is non-final.
 3) Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

4) Claim(s) 1-9, 15-23, 28-36 is/are pending in the application.
 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
 5) Claim(s) 10-14, 24-27 and 37-40 is/are allowed.
 6) Claim(s) 1-5, 7 and 15-19, 21, 23, 28-32, 34, 36 is/are rejected.
 7) Claim(s) 6, 8, 9, 20, 22, 33 and 35 is/are objected to.
 8) Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

9) The specification is objected to by the Examiner.
 10) The drawing(s) filed on 19 September 2003 is/are: a) accepted or b) objected to by the Examiner.
 Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
 Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
 11) The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

12) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
 a) All b) Some * c) None of:
 1. Certified copies of the priority documents have been received.
 2. Certified copies of the priority documents have been received in Application No. _____.
 3. Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892)	4) <input type="checkbox"/> Interview Summary (PTO-413)
2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948)	Paper No(s)/Mail Date. _____
3) <input checked="" type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08) Paper No(s)/Mail Date _____	5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152)
	6) <input type="checkbox"/> Other: _____

DETAILED ACTION

Claim Rejections - 35 USC § 102

1. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

2. Claims 1, 3, 15 and 17 are rejected under 35 U.S.C. 102(e) as being anticipated by **Shanahan** [US. 2004/0148226].

Regarding claims 1 and 15, **Shanahan** discloses a method and a system for detecting potential theft, comprising:

programmatically comparing data stored in a radio frequency identification (RFID) tag on merchandise to data written on a consumer carried sales receipt; and concluding that a potential theft is detected if the comparing step finds that the data stored in the RFID on the merchandise does not match the data written on the sales receipt (paragraph [0051]).

Regarding claims 3 and 17, **Shanahan** ([0051]) discloses the data stored in the RFID tag comprises a unique item identifier (identification device) of the tagged merchandise.

Claim Rejections - 35 USC § 103

3. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

4. Claims 2 and 16 are rejected under 35 U.S.C. 103(a) as being unpatentable over **Shanahan** in view of **Hanna et al** [US. 2004/0016796].

Regarding claim 2 and 16, **Shanahan** does not specify that the data written on the consumer carried electronic sales receipt is in the form of an RFID tag affixed to the sales receipt; **Hanna et al** teach storing financial transaction information including item ID, number of items, item dollar amount and dollar sum, etc. in an RFID tag affixed to a transaction receipt (592, fig. 69) for the convenient verification of the transaction ([0258]-[0264]). It would have been obvious to one having ordinary skill in the art at the time of the invention was made to implement the consumer carried electronic sales receipt of **Shanahan** using an RFID affixed financial transaction receipt of **Hanna et al** so that the RFID tag is affixed to the sales receipt providing more convenient by virtue of its smaller size.

5. Claims 4-5 and 18-19 are rejected under 35 U.S.C. 103(a) as being unpatentable over **Shanahan** in view of **Ruppert et al** [US. 5,640,002].

Regarding claims 4-5 and 18-19, **Shanahan** does not disclose in detail the identification information content of data stored in the RFID tag; **Ruppert et al** discloses the data stored in the RFID tag comprises a unique item identifier of the tagged

merchandise including serial numbers identifying the particular tag, the consumer product class code and the consumer product code, therefore the SKU and EPC are inherent (col. 22, lines 34-37; col. 37, lines 17-20).

6. Claims 7, 21 and 23 are rejected under 35 U.S.C. 103(a) unpatentable over **Shanahan and Hanna et al** in view of **Ruppert et al** [US. 5,640,002].

Regarding claims 7 and 21, **Shanahan and Hanna et al** combined disclose a method and a system for preparing information usable in theft detection using RFID technology on a transaction receipt, comprising:

reading, for each of one or more items presented for purchase, identifying information previously stored in an RFID tag affixed thereto (Shanahan [0051]);

storing the identification information data in an RFID tag affixed to a transaction receipt (Hanna et al, 592, fig. 69).

Shanahan and Hanna et al do not disclose computing a checksum from information read on the identification label; **Ruppert et al** teach it is well known in code scanning technique, a checksum is computed and stored along with information data to latter verify the validity of the data (col. 10, lines 19-30). It would have been obvious to one having ordinary skill in the art at the time of the invention was made to implement the checksum technique as taught by Ruppert et al to Shanahan method and system to increase the reliability of information data written on the RFID transaction receipt.

7. Regarding claim 23, **Shanahan, Hanna et al** and **Ruppert et al** combined do not disclose remembering each item that was in the shopper's possession when the shopper entered an establishment, however known business practice at many stores (Best Buy, Costco, etc.) keep and remember items that are previously purchased by the shopper when he or she enters the store such that when the shopper arrives at the store exit check area, the receipt is checked against newly purchased items only so that the comparing and the concluding steps do not apply to the remembered items. Since this method of practice is known in manual scanning and theft checking stores, it would have been obvious to one having ordinary skill in the art at the time of the invention was made to not include the shopper's previously owned items with the items to be checked (for example, write on the RFID tag affixed to the item, data indicating the item has been paid for; Ruppert et al, col. 36, lines 19-37).

8. Claims 28 and 30 are rejected under 35 U.S.C. 103(a) as being unpatentable over **Shanahan** similar to the rejection to the method and the system for detecting theft of claims 1, 3, 15 and 17 with a reason that to make the system function automatically in a store equipped with computer, it would have been obvious to one having ordinary skill in the art at the time of the invention was made a computer program product is obviously being implement.

9. Claim 29 is rejected under 35 U.S.C. 103(a) as being unpatentable over **Shanahan** and **Hanna et al** similar to the rejection to the method and the system for detecting theft of claims 2 and 16 with a reason that to make the system function automatically in a store equipped with computer, it would have been obvious to one

having ordinary skill in the art at the time of the invention was made a computer program product is obviously being implement.

10. Claims 31-32 are rejected under 35 U.S.C. 103(a) as being unpatentable over **Shanahan and Ruppert et al** similar to the rejection to the method and the system for detecting theft of claims 4, 5, 18 and 19 with a reason that to make the system function automatically in a store equipped with computer, it would have been obvious to one having ordinary skill in the art at the time of the invention was made a computer program product is obviously being implement.

11. Claims 34 and 36 are rejected under 35 U.S.C. 103(a) as being unpatentable over **Shanahan, Hanna et al** and **Ruppert et al** similar to the rejection to the method and the system for detecting theft of claims 21 and 23 with a reason that to make the system function automatically in a store equipped with computer, it would have been obvious to one having ordinary skill in the art at the time of the invention was made a computer program product is obviously being implement.

Allowable Subject Matter

12. The following is an examiner's statement of reasons for allowance:

Claims 10-14, 24-27 and 37-40 are allowed over prior art of record because the cited references either alone or combined do not disclose the claimed invention:

A method, a system or a computer program product for detecting potential theft using radio frequency identification (RFID) technology on a transaction receipt, comprising:

reading, for each or more items presented for purchase, identifying information previously stored in an RFID tag affixed thereto;

computing a first checksum over selected portions of the identifying information that has been read for each item;

storing the first checksum in an RFID tag affixed to a transaction receipt corresponding to the purchase;

subsequently presenting one or more items and the receipt;

determining whether the subsequently-presented items are associated with the receipt,

computing a new checksum over corresponding identifying information for each of the one or more subsequently-presented items, wherein the identifying information for each of the subsequently-presented items is read from an RFID tag affixed thereto; and

concluding that the subsequently-presented items are not associated with the receipt, if the checksum is not equal to the new checksum; and

charging a fee for carrying out one or more of the computing, storing, and determining steps.

The underline limitations are critical since it shows the method and the system of improvement.

Any comments considered necessary by applicant must be submitted no later than the payment of the issue fee and, to avoid processing delays, should preferably

accompany the issue fee. Such submissions should be clearly labeled "Comments on Statement of Reasons for Allowance."

13. Claims 6, 8-9, 20, 22-23, 33 and 35 are objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

Conclusion

14. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure.

Bauer et al disclose an inventory management system. [US. 2003/0216969]

Smith et al disclose methods and systems for electronic receipt transmission and management. [US. 6,487,540]

Goodwin et al disclose an EPL price verification system and method. [US. 6,073,843]

Swartz et al disclose a statistical sampling security methodology for self-scanning checkout system. [US. 6,672,506]

Schwartz discloses a method and apparatus for spot checkout cashier operation in a store. [US. 3,878,365]

Morrison et al disclose a retail system for allowing a customer to perform a retail transaction and associated method. [US. 6,382,357]

Walter et al disclose a self-service checkout apparatus. [US. 5,992,570]

Van Solt discloses a method for spot-checking a client in a self-service store.

[US. 5,397,882]

Humble et al disclose a self-service distribution system. [US. 4,676,343]

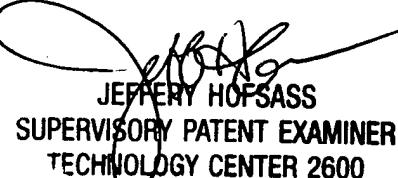
15. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Anne V. Lai whose telephone number is 571-272-2974. The examiner can normally be reached on 8:00 am to 5:30 pm, Monday to Thursday.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Hofsass Jeffery can be reached on 571-272-2981. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

A. V. Lai *AVL*

January 11, 2005


JEFFERY HOFSSASS
SUPERVISORY PATENT EXAMINER
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